

**This Page is Inserted by IFW Indexing and Scanning
Operations and is not part of the Official Record**

BEST AVAILABLE IMAGES

Defective images within this document are accurate representations of the original documents submitted by the applicant.

Defects in the images include but are not limited to the items checked:

- ☐ **BLACK BORDERS**
- ☐ **IMAGE CUT OFF AT TOP, BOTTOM OR SIDES**
- ☐ **FADED TEXT OR DRAWING**
- ☐ **BLURRED OR ILLEGIBLE TEXT OR DRAWING**
- ☐ **SKEWED/SLANTED IMAGES**
- ☐ **COLOR OR BLACK AND WHITE PHOTOGRAPHS**
- ☐ **GRAY SCALE DOCUMENTS**
- ☐ **LINES OR MARKS ON ORIGINAL DOCUMENT**
- ☐ **REFERENCE(S) OR EXHIBIT(S) SUBMITTED ARE POOR QUALITY**
- ☐ **OTHER:** _____

IMAGES ARE BEST AVAILABLE COPY.

As rescanning these documents will not correct the image problems checked, please do not report these problems to the IFW Image Problem Mailbox.

Ref #	Hits	Search Query	DBs	Default Operator	Plurals	Time Stamp
L1	15	"5426708"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/14 17:51
S1	119	(fingerprint\$4 same imag\$3) and (((edge\$1 or ridge\$1 or line\$1) and (valley\$1 or furrow\$1)) and (point\$1 same (densit\$5 or grey or intensit\$6))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/27 15:05
S2	119	(fingerprint\$4 same imag\$3) and (((edge\$1 or ridge\$1 or line\$1 or crest\$1) and (valley\$1 or furrow\$1)) and (point\$1 same (densit\$5 or grey or intensit\$6))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:05
S3	35	(fingerprint\$4 same imag\$3) and (((edge\$1 or ridge\$1 or line\$1 or crest\$1) near3 point\$1) and ((valley\$1 or furrow\$1) and point\$1) same compar\$5)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/27 15:27
S4	2586	382/100,124,125,126.ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/27 15:51
S5	345	382/100,124,125,126.ccls. and (((ridge\$1 or edge\$1 or crest\$1) and (furrow\$1 or valley\$1)))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/05 10:59
S6	214	(382/100,124,125,126.ccls. and (((ridge\$1 or edge\$1 or crest\$1) and (furrow\$1 or valley\$1))) and (densit\$5 or grey or gray or intensit\$)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/27 15:53
S7	442	(evalut\$8 or qual\$5) same (fingerprint near3 imag\$4)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:19
S8	0	(evalut\$8) same (fingerprint near3 imag\$4)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:19
S9	1	(evalut\$8) and (fingerprint near3 imag\$4)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:19

S10	170	((evalut\$8 or qual\$5) same (fingerprint near3 imag\$4)) and ((ridge\$1 or edge\$1 or crest\$1) and (furrow\$1 or valley\$1))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:45
S11	879807	((evalut\$8 or qual\$5) same (fingerprint near3 imag\$4)) and ((ridge\$1 or edge\$1 or crest\$1) and (furrow\$1 or valley\$1))) and compar\$ or match\$	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:25
S12	162	((evalut\$8 or qual\$5) same (fingerprint near3 imag\$4)) and ((ridge\$1 or edge\$1 or crest\$1) and (furrow\$1 or valley\$1))) and (compar\$ or match\$)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:25
S13	27	((evalut\$8 or qual\$5) same (fingerprint near3 imag\$4)) and (((ridge\$1 or edge\$1 or crest\$1) and (furrow\$1 or valley\$1)) same (ratio\$1 or percentage\$2 or propor\$9))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:30
S14	412	fingerprint and oscillation	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:43
S15	8291	fingerprint and (oscillation or frequ\$5)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:43
S16	8451	fingerprint and (oscillation or frequ\$8)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:43
S17	507	(fingerprint and (oscillation or frequ\$8)) and ((ridge\$1 or edge\$1 or crest\$1) and (furrow\$1 or valley\$1))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:48
S18	0	((fingerprint and (oscillation or frequ\$8)) and ((ridge\$1 or edge\$1 or crest\$1) and (furrow\$1 or valley\$1))) and (continous near3 wave\$5)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:47
S19	184	((fingerprint and (oscillation or frequ\$8)) and ((ridge\$1 or edge\$1 or crest\$1) and (furrow\$1 or valley\$1))) and magnitude	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:48

S20	25	((fingerprint and (oscillation or frequ\$8)) and ((ridge\$1 or edge\$1 or crest\$1) and (furrow\$1 or valley\$1))) and (magnitude\$1 near4 (oscillation\$4 or frequ\$8))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/10/31 19:48
S21	5557	fingerprint\$1 and (imag\$4 and qualit\$5)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:04
S22	1904	fingerprint\$1 and (imag\$4 near4 qualit\$5)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:05
S23	421	(fingerprint\$1 and (imag\$4 near4 qualit\$5)) and ((edge\$1 or ridge\$6 or line\$1 or crest\$1) and (valley\$1 or furrow\$1 or groove\$1))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:07
S24	75	((fingerprint\$1 and (imag\$4 near4 qualit\$5)) and ((edge\$1 or ridge\$6 or line\$1 or crest\$1) and (valley\$1 or furrow\$1 or groove\$1))) and ((determin\$6 or check\$4) near3 qualit\$4)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:08
S25	82	(fingerprint\$4 same imag\$3) and ((edge\$1 or ridge\$6 or line\$1 or crest\$1) same (valley\$1 or furrow\$1 or groove\$1)) same qualit\$5	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:19
S26	53	(fingerprint\$4 same imag\$3) and ((edge\$1 or ridge\$6 or line\$1 or crest\$1) same (valley\$1 or furrow\$1 or groove\$1)) same (qualit\$5 near3 imag\$3)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:26
S27	0	(fingerprint\$4 same imag\$3) and ((edge\$1 or ridge\$6 or line\$1 or crest\$1) same (valley\$1 or furrow\$1 or groove\$1)) same (qualit\$5 near3 judg\$5)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:26
S28	21	(fingerprint\$4 same imag\$3) same (qualit\$5 near3 judg\$5)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:29
S29	21	(fingerprint\$4 same imag\$3) same (qualit\$5 near3 (evalut\$5 or judg\$5))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:30

S30	24	(fingerprint\$4 same imag\$3) same (qualit\$5 near6 (evalut\$5 or judg\$5))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:42
S31	51	(fingerprint\$4 same imag\$3) and (qualit\$5 near6 (evalut\$5 or judg\$5))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:41
S32	24	(fingerprint\$4 same imag\$3) same (qualit\$5 near6 (evalut\$5 or judg\$5))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:42
S33	27	((fingerprint\$4 same imag\$3) and (qualit\$5 near6 (evalut\$5 or judg\$5))) not ((fingerprint\$4 same imag\$3) same (qualit\$5 near6 (evalut\$5 or judg\$5)))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 07:42
S34	1	(auto near3 correlat\$5) and (fingerprint near3 imag\$3) and (compar\$4 near5 point\$1) and (densit\$5 or (phase near3 (chang\$4 or shift\$4 or differen\$4)))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 09:06
S35	2	(auto near3 correlat\$5) and (fingerprint near3 imag\$3) and (compar\$4 near5 point\$1) and (densit\$5 or intensit\$ or freq\$6 or (phase near3 (chang\$4 or shift\$4 or differen\$4)))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 09:07
S36	2	(auto near3 correlat\$5) and (fingerprint near3 imag\$3) and (compar\$4 near5 point\$1) and (densit\$5 or intensit\$ or freq\$6 or (phase near3 (chang\$4 or shift\$4 or differen\$4)))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 09:08
S37	15	(auto near3 correlat\$5) and (fingerprint near3 imag\$3) and (densit\$5 or intensit\$ or freq\$6 or (phase near3 (chang\$4 or shift\$4 or differen\$4)))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 09:17
S38	496700	NEC.as.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 09:17
S39	249	NEC.as. and (fingerprint\$1 near3 imag\$4)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 09:18

S40	9	((NEC.as. and (fingerprint\$1 near3 imag\$4)) and ((densit\$5 or intensit\$5) same compar\$5)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 09:19
S41	70	((fingerprint\$4 same imag\$3) same quality) and ((densit\$5 or intensit\$4) same contrast\$4)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 10:01
S42	20	((fingerprint\$4 same imag\$3) same quality) and (((densit\$5 or intensit\$4) same contrast\$4) same compar\$)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/01 10:01
S43	1126	(fingerprint\$4 same imag\$3) and density and quality	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/04 09:54
S44	1912	(fingerprint\$4 same imag\$3) and (intensit\$5 or frequenc\$5 or oscillation\$5 or densit\$5) and quality	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/04 09:57
S45	490	((fingerprint\$4 same imag\$3) and (intensit\$5 or frequenc\$5 or oscillation\$5 or densit\$5) and quality) and ((edge\$1 or ridge\$5 or crest\$5) and (valley\$1 or furrow\$1 or groove\$3))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/04 09:57
S46	92	(fingerprint\$4 same imag\$3) and ((intensit\$5 or frequenc\$5 or oscillation\$5 or densit\$5) same ((edge\$1 or ridge\$5 or crest\$5) and (valley\$1 or furrow\$1 or groove\$3))) and quality	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/04 10:08
S47	63	((fingerprint\$4 same imag\$3) same quality) and ((intensit\$5 or frequenc\$5 or oscillation\$5 or densit\$5) same ((edge\$1 or ridge\$5 or crest\$5) and (valley\$1 or furrow\$1 or groove\$3)))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/04 10:09

S48	34	(US-6538456-\$ or US-5963656-\$ or US-4015240-\$ or US-3959884-\$ or US-6134340-\$ or US-5953442-\$ or US-5572597-\$ or US-5537484-\$ or US-4053228-\$ or US-5633947-\$ or US-3891968-\$ or US-4876726-\$ or US-4790564-\$ or US-6018586-\$ or US-4872203-\$ or US-4832485-\$ or US-4310827-\$ or US-6324020-\$ or US-6091839-\$ or US-4817183-\$ or US-4747147-\$ or US-4525859-\$ or US-4322163-\$ or US-4723298-\$ or US-4385831-\$ or US-4544267-\$).did. or (US-4156230-\$ or US-5883971-\$ or US-5040224-\$ or US-4936680-\$).did. or (US-20020181749-\$ or US-20030035569-\$).did. or (EP-450786-\$ or US-5883971-\$).did.	US-PGPUB; USPAT; DERWENT	OR	OFF	2004/11/05 09:28
S49	26	((US-6538456-\$ or US-5963656-\$ or US-4015240-\$ or US-3959884-\$ or US-6134340-\$ or US-5953442-\$ or US-5572597-\$ or US-5537484-\$ or US-4053228-\$ or US-5633947-\$ or US-3891968-\$ or US-4876726-\$ or US-4790564-\$ or US-6018586-\$ or US-4872203-\$ or US-4832485-\$ or US-4310827-\$ or US-6324020-\$ or US-6091839-\$ or US-4817183-\$ or US-4747147-\$ or US-4525859-\$ or US-4322163-\$ or US-4723298-\$ or US-4385831-\$ or US-4544267-\$).did. or (US-4156230-\$ or US-5883971-\$ or US-5040224-\$ or US-4936680-\$).did. or (US-20020181749-\$ or US-20030035569-\$).did. or (EP-450786-\$ or US-5883971-\$).did.) and (shift\$5 or mov\$6 or (re adj (position\$4 or locat\$5)))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/05 09:38
S50	91	(fingerprint near3 image) and (((point\$1 or pixel\$1) same (densit\$5 or intensit\$6)) same differen\$4)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/05 11:02
S51	91	(fingerprint near3 image) and ((point\$1 or pixel\$1) same ((densit\$5 or intensit\$6) same differen\$4))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/05 11:03
S52	39	(fingerprint near3 image) and ((point\$1 or pixel\$1) same ((densit\$5 or intensit\$6) near4 differen\$4))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/11/05 11:03